

**DEPARTMENT OF TRANSPORTATION****Federal Aviation Administration****14 CFR Part 39**

[Docket No. FAA-2021-0383; Project Identifier 2018-SW-005-AD; Amendment 39-21671; AD 2021-16-09]

RIN 2120-AA64

**Airworthiness Directives; Leonardo S.p.a. Helicopters**

**AGENCY:** Federal Aviation Administration (FAA), DOT.

**ACTION:** Final rule.

**SUMMARY:** The FAA is adopting a new airworthiness directive (AD) for certain Leonardo S.p.a. Model AW189 helicopters. This AD was prompted by corrosion on the inlet check valve banjo fitting of emergency flotation system (EFS) float assemblies. This AD requires visually inspecting each banjo fitting installed on an affected EFS float assembly, and depending on the results, removing the banjo fitting from service. This AD also requires applying corrosion inhibiting compound and prohibits installing an affected EFS float assembly unless certain requirements have been accomplished as specified in a European Aviation Safety Agency (now European Union Aviation Safety Agency) (EASA) AD, which is incorporated by reference. The FAA is issuing this AD to address the unsafe condition on these products.

**DATES:** This AD is effective October 13, 2021.

The Director of the Federal Register approved the incorporation by reference of a certain publication listed in this AD as of October 13, 2021.

**ADDRESSES:** For material incorporated by reference (IBR) in this AD, contact the EASA, Konrad-Adenauer-Ufer 3, 50668 Cologne, Germany; telephone +49 221 8999 000; email [ADs@easa.europa.eu](mailto:ADs@easa.europa.eu); internet [www.easa.europa.eu](http://www.easa.europa.eu).

You may find this material on the EASA website at <https://ad.easa.europa.eu>. For Aero Sekur and Leonardo Helicopters service information identified in this final rule, contact Leonardo S.p.A. Helicopters, Emanuele Bufano, Head of Airworthiness, Viale G. Agusta 520, 21017 C. Costa di Samarate (Va) Italy; telephone +39-0331-225074; fax +39-0331-229046; or at <https://customerportal.leonardocompany.com/en-US/>. You may view this material at the FAA, Office of the Regional Counsel, Southwest Region, 10101 Hillwood Pkwy., Room 6N-321, Fort Worth, TX 76177. For information on the

availability of this material at the FAA, call (817) 222-5110. It is also available in the AD docket at <https://www.regulations.gov> by searching for and locating Docket No. FAA-2021-0383.

**Examining the AD Docket**

You may examine the AD docket at <https://www.regulations.gov> by searching for and locating Docket No. FAA-2021-0383; or in person at Docket Operations between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays. The AD docket contains this final rule, any comments received, and other information. The address for Docket Operations is U.S. Department of Transportation, Docket Operations, M-30, West Building Ground Floor, Room W12-140, 1200 New Jersey Avenue SE, Washington, DC 20590.

**FOR FURTHER INFORMATION CONTACT:** Kristin Bradley, Program Manager, COS Program Management Section, Operational Safety Branch, Compliance & Airworthiness Division, FAA, 10101 Hillwood Pkwy., Fort Worth, TX 76177; telephone (817) 222-5110; email [kristin.bradley@faa.gov](mailto:kristin.bradley@faa.gov).

**SUPPLEMENTARY INFORMATION:****Background**

EASA, which is the Technical Agent for the Member States of the European Union, has issued a series of ADs, the most recent being EASA AD 2018-0006, dated January 10, 2018 (EASA AD 2018-0006), to correct an unsafe condition for Leonardo S.p.A. Helicopters (formerly Finmeccanica S.p.A., AgustaWestland S.p.A.) Model AW189 helicopters with certain part-numbered and serial-numbered Aero Sekur EFS float assemblies installed, except those float assemblies marked with SB-189-25-004. EASA initially issued EASA AD 2017-0256, dated December 22, 2017 (EASA AD 2017-0256), to address the unsafe condition. EASA issued EASA AD 2018-0006 to supersede EASA AD 2017-0256 to revise the compliance time based on the EFS float assembly condition.

The FAA issued a notice of proposed rulemaking (NPRM) to amend 14 CFR part 39 by adding an AD that would apply to certain Leonardo S.p.a. Model AW189 helicopters. The NPRM published in the **Federal Register** on May 28, 2021 (86 FR 28714). The NPRM was prompted by corrosion on the inlet check valve banjo fitting of EFS float assemblies. The NPRM proposed to require visually inspecting each banjo fitting installed on an affected EFS float assembly, and depending on the results, removing the banjo fitting from service.

The NPRM also proposed to require applying corrosion inhibiting compound to each banjo fitting installed on an affected EFS float assembly and prohibit installing an affected EFS float assembly unless the banjo fitting inspection, banjo fitting replacement, and corrosion inhibiting compound application requirements have been accomplished, as specified in an EASA AD.

The FAA is issuing this AD to prevent reduced inflation of an EFS float. The unsafe condition, if not addressed, could affect the helicopter's buoyancy during an emergency landing on water. See EASA AD 2018-0006 for additional background information.

**Discussion of Final Airworthiness Directive****Comments**

The FAA gave the public the opportunity to participate in developing this final rule. The FAA received no comments on the NPRM or on the determination of the cost to the public.

**Conclusion**

The FAA reviewed the relevant data and determined that air safety and the public interest require adopting this final rule as proposed.

**Related Service Information Under 14 CFR Part 51**

EASA AD 2018-0006 requires visually inspecting the banjo fittings installed on an affected EFS float assembly. If there is corrosion on a banjo fitting, EASA AD 2018-0006 requires replacing the banjo fitting. EASA AD 2018-0006 also requires applying corrosion inhibiting compound to each banjo fitting installed on an affected EFS float assembly. EASA AD 2018-0006 prohibits installing an affected EFS float assembly unless the banjo fitting inspection, banjo fitting replacement, and corrosion inhibiting compound application requirements have been accomplished. EASA AD 2018-0006 also allows credit for actions accomplished previously with a prior revision of the Leonardo Helicopters service information.

This material is reasonably available because the interested parties have access to it through their normal course of business or by the means identified in the **ADDRESSES** section.

**Other Related Service Information**

The FAA reviewed Leonardo Helicopters Alert Service Bulletin No. 189-174, original issue, dated December 22, 2017 (ASB 189-174 original issue), and Revision A, dated January 5, 2018 (ASB 189-174 Rev A). The FAA also

reviewed Aero Sekur Service Bulletin SB-189-25-004, original issue, dated November 22, 2017 (SB-189-25-004), which is attached as Annex A to ASB 189-174 original issue and ASB 189-174 Rev A.

ASB 189-174 Rev A and ASB 189-174 original issue specify the same procedures, except the compliance time specified by ASB 189-174 Rev A has been revised by adding affected EFS float assemblies that have been inspected using procedures in the maintenance manual within the previous 12 months. ASB 189-174 original issue and ASB 189-174 Rev A specify accomplishing the Visual Inspection and Corrosion Prevention, and Record Instruction procedures specified in SB-189-25-004. ASB 189-174 original issue and ASB 189-174 Rev A also specify emailing photographic evidence of each corroded banjo fitting to Leonardo Helicopters PSE Division and returning replaced banjo fittings to Leonardo Helicopters Customer Support Division.

SB-189-25-004 specifies procedures for cleaning and visually inspecting each banjo fitting for evidence of corrosion. If there is corrosion, SB-189-25-004 specifies procedures for discarding the banjo fitting and its O-rings, and installing a new banjo fitting. SB-189-25-004 also specifies procedures for applying corrosion inhibiting compound (JC5A or Mastinox 6856) on all banjo fittings. When SB-189-25-004 is accomplished, SB-189-25-004 specifies procedures for marking the identification label of the EFS float assembly.

#### Differences Between This AD and the EASA AD

EASA AD 2018-0006 requires returning and discarding certain parts, whereas this AD requires removing those parts from service instead.

#### Costs of Compliance

The FAA estimates that this AD affects 4 helicopters of U.S. Registry. Labor rates are estimated at \$85 per work-hour. Based on these numbers, the FAA estimates the following costs to comply with this AD.

Inspecting the banjo fittings takes about 8.5 work-hours for an estimated cost of \$723 per helicopter and \$2,892 for the U.S. fleet. Applying corrosion inhibiting compound takes about 1.5 work-hours for an estimated cost of \$128 per helicopter and \$512 for the U.S. fleet. If required, replacing a banjo fitting takes a minimal additional amount of time after inspecting it and parts cost about \$550 for an estimated cost of \$550 per helicopter.

#### Authority for This Rulemaking

Title 49 of the United States Code specifies the FAA's authority to issue rules on aviation safety. Subtitle I, section 106, describes the authority of the FAA Administrator. Subtitle VII: Aviation Programs, describes in more detail the scope of the Agency's authority.

The FAA is issuing this rulemaking under the authority described in Subtitle VII, Part A, Subpart III, Section 44701: General requirements. Under that section, Congress charges the FAA with promoting safe flight of civil aircraft in air commerce by prescribing regulations for practices, methods, and procedures the Administrator finds necessary for safety in air commerce. This regulation is within the scope of that authority because it addresses an unsafe condition that is likely to exist or develop on products identified in this rulemaking action.

#### Regulatory Findings

This AD will not have federalism implications under Executive Order 13132. This AD will not have a substantial direct effect on the States, on the relationship between the national government and the States, or on the distribution of power and responsibilities among the various levels of government.

For the reasons discussed above, I certify that this AD:

- (1) Is not a "significant regulatory action" under Executive Order 12866,
- (2) Will not affect intrastate aviation in Alaska, and
- (3) Will not have a significant economic impact, positive or negative, on a substantial number of small entities under the criteria of the Regulatory Flexibility Act.

#### List of Subjects in 14 CFR Part 39

Air transportation, Aircraft, Aviation safety, Incorporation by reference, Safety.

#### The Amendment

Accordingly, under the authority delegated to me by the Administrator, the FAA amends 14 CFR part 39 as follows:

#### PART 39—AIRWORTHINESS DIRECTIVES

- 1. The authority citation for part 39 continues to read as follows:

Authority: 49 U.S.C. 106(g), 40113, 44701.

##### § 39.13 [Amended]

- 2. The FAA amends § 39.13 by adding the following new airworthiness directive:

**2021-16-09 Leonardo S.p.a.:** Amendment 39-21671; Docket No. FAA-2021-0383; Project Identifier 2018-SW-005-AD.

#### (a) Effective Date

This airworthiness directive (AD) is effective October 13, 2021.

#### (b) Affected ADs

None.

#### (c) Applicability

This AD applies to Leonardo S.p.a. Model AW189 helicopters, certificated in any category, as identified in European Aviation Safety Agency (now European Union Aviation Safety Agency) (EASA) AD 2018-0006, dated January 10, 2018 (EASA AD 2018-0006).

#### (d) Subject

Joint Aircraft Service Component (JASC) Code: 3212, Emergency Flotation Section.

#### (e) Unsafe Condition

This AD was prompted by corrosion on the inlet check valve banjo fitting of emergency flotation system (EFS) float assemblies. The FAA is issuing this AD to prevent reduced inflation of an EFS float. The unsafe condition, if not addressed, could affect the helicopter's buoyancy during an emergency landing on water.

#### (f) Compliance

Comply with this AD within the compliance times specified, unless already done.

#### (g) Requirements

Except as specified in paragraph (h) of this AD: Comply with all required actions and compliance times specified in, and in accordance with, EASA AD 2018-0006.

#### (h) Exceptions to EASA AD 2018-0006

(1) Where EASA AD 2018-0006 refers to December 29, 2017 (the effective date of EASA AD 2017-0256, dated December 22, 2017), this AD requires using the effective date of this AD.

(2) Where the service information referenced in EASA AD 2018-0006 specifies to return a certain part, this AD requires removing that part from service.

(3) Where the service information referenced in EASA AD 2018-0006 specifies to discard certain parts, this AD requires removing those parts from service.

(4) The "Remarks" section of EASA AD 2018-0006 does not apply to this AD.

#### (i) No Reporting Requirement

Although the service information referenced in EASA AD 2018-0006 specifies to submit certain information to the manufacturer, this AD does not include that requirement.

#### (j) Alternative Methods of Compliance (AMOCs)

(1) The Manager, International Validation Branch, FAA, has the authority to approve AMOCs for this AD, if requested using the procedures found in 14 CFR 39.19. In accordance with 14 CFR 39.19, send your request to your principal inspector or local

Flight Standards District Office, as appropriate. If sending information directly to the manager of the International Validation Branch, send it to the attention of the person identified in paragraph (k) of this AD. Information may be emailed to: [9-AVS-AIR-730-AMOC@faa.gov](mailto:9-AVS-AIR-730-AMOC@faa.gov).

(2) Before using any approved AMOC, notify your appropriate principal inspector, or lacking a principal inspector, the manager of the local flight standards district office/certificate holding district office.

#### (k) Related Information

For more information about this AD, contact Kristi Bradley, Program Manager, COS Program Management Section, Operational Safety Branch, Compliance & Airworthiness Division, FAA, 10101 Hillwood Pkwy., Fort Worth, TX 76177; telephone (817) 222-5110; email [kristin.bradley@faa.gov](mailto:kristin.bradley@faa.gov).

#### (l) Material Incorporated by Reference

(1) The Director of the Federal Register approved the incorporation by reference (IBR) of the service information listed in this paragraph under 5 U.S.C. 552(a) and 1 CFR part 51.

(2) You must use this service information as applicable to do the actions required by this AD, unless this AD specifies otherwise.

(i) European Aviation Safety Agency (EASA) AD 2018-0006, dated January 10, 2018.

(ii) [Reserved]

(3) For EASA AD 2018-0006, contact the EASA, Konrad-Adenauer-Ufer 3, 50668 Cologne, Germany; telephone +49 221 8999 000; email [ADs@easa.europa.eu](mailto:ADs@easa.europa.eu); internet [www.easa.europa.eu](http://www.easa.europa.eu). You may find this EASA AD on the EASA website at <https://ad.easa.europa.eu>.

(4) You may view this service information at the FAA, Office of the Regional Counsel, Southwest Region, 10101 Hillwood Pkwy., Room 6N-321, Fort Worth, TX 76177. For information on the availability of this material at the FAA, call (817) 222-5110. This material may be found in the AD docket at <https://www.regulations.gov> by searching for and locating Docket No. FAA-2021-0383.

(5) You may view this material that is incorporated by reference at the National Archives and Records Administration (NARA). For information on the availability of this material at NARA, email [fr.inspection@nara.gov](mailto:fr.inspection@nara.gov), or go to <https://www.archives.gov/federal-register/cfr/ibr-locations.html>.

Issued on July 26, 2021.

**Lance T. Gant,**

Director, Compliance & Airworthiness Division, Aircraft Certification Service.

[FR Doc. 2021-19249 Filed 9-7-21; 8:45 am]

**BILLING CODE 4910-13-P**

## DEPARTMENT OF TRANSPORTATION

### Federal Aviation Administration

#### 14 CFR Part 39

[Docket No. FAA-2021-0377; Project Identifier MCAI-2021-00380-R; Amendment 39-21674; AD 2021-16-12]

RIN 2120-AA64

#### Airworthiness Directives; Bell Textron Canada Limited Helicopters

**AGENCY:** Federal Aviation Administration (FAA), DOT.

**ACTION:** Final rule.

**SUMMARY:** The FAA is adopting a new airworthiness directive (AD) for certain Bell Textron Canada Limited Model 505 helicopters. This AD was prompted by three occurrences of metallic debris in the engine oil lubrication system causing the 12 volts direct current (VDC) reference voltage to be shorted to ground and loss of important flight information to the pilot. This AD requires replacing a certain part-numbered relay panel assembly. The FAA is issuing this AD to address the unsafe condition on these products.

**DATES:** This AD is effective October 13, 2021.

The Director of the Federal Register approved the incorporation by reference of a certain document listed in this AD as of October 13, 2021.

**ADDRESSES:** For service information identified in this final rule, contact Bell Textron Canada Limited, 12,800 Rue de l'Avenir, Mirabel, Quebec J7J1R4, Canada; telephone (450) 437-2862 or (800) 363-8023; fax (450) 433-0272; email [productsupport@bellflight.com](mailto:productsupport@bellflight.com); or at <https://www.bellflight.com/support/contact-support>. You may view the referenced service information at the FAA, Office of the Regional Counsel, Southwest Region, 10101 Hillwood Pkwy., Room 6N-321, Fort Worth, TX 76177. For information on the availability of this material at the FAA, call (817) 222-5110. It is also available at <https://www.regulations.gov> by searching for and locating Docket No. FAA-2021-0377.

#### Examining the AD Docket

You may examine the AD docket at <https://www.regulations.gov> by searching for and locating Docket No. FAA-2021-0377; or in person at Docket Operations between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays. The AD docket contains this final rule, the Transport Canada AD, any comments received, and other information. The street address for

Docket Operations is U.S. Department of Transportation, Docket Operations, M-30, West Building Ground Floor, Room W12-140, 1200 New Jersey Avenue SE, Washington, DC 20590.

**FOR FURTHER INFORMATION CONTACT:** Hal Jensen, Aerospace Engineer, Operational Safety Branch, Compliance & Airworthiness Division, FAA, 950 L'Enfant Plaza N SW, Washington, DC 20024; telephone (202) 267-9167; email [hal.jensen@faa.gov](mailto:hal.jensen@faa.gov).

#### SUPPLEMENTARY INFORMATION:

##### Background

The FAA issued a notice of proposed rulemaking (NPRM) to amend 14 CFR part 39 by adding an AD that would apply to Bell Textron Canada Limited Model 505 helicopters, with serial numbers 65011 through 65023 inclusive, 65025 through 65028 inclusive, 65030 through 65032 inclusive, 65034, and 65036 with relay panel assembly part number (P/N) SLS-075-002-107 installed. The NPRM published in the **Federal Register** on May 25, 2021 (86 FR 28038). In the NPRM, the FAA proposed to require replacing relay panel assembly part number P/N SLS-075-002-107 with relay panel assembly P/N SLS-075-002-109. The NPRM also proposed to prohibit installing relay panel assembly P/N SLS-075-002-107 on any helicopter. The NPRM was prompted by Canadian AD CF-2017-36, dated December 15, 2017 (Canadian AD CF-2017-36), issued by Transport Canada, which is the aviation authority for Canada, to correct an unsafe condition for Bell Helicopter Textron Canada Limited (BHTCL) (now Bell Textron Canada Limited) Model 505 helicopters serial numbers 65011 through 65023, 65025 through 65028, 65030 through 65032, 65034, and 65036. Transport Canada advises of three occurrences of metallic debris in the engine oil lubrication system of the Model 505 helicopter causing the Garmin Engine Airframe (GEA) 12 VDC reference voltage to be shorted to ground. This short to ground results in loss of display of important flight information including the main rotor rotations per minute (Nr), fuel quantity, and transmission oil pressure and temperature, and the generator voltage and ammeter parameters are marked invalid with a red "X" on the primary flight display (PFD) and the multi-function display (MFD). This condition, if not addressed, could result in loss of caution, advisory, and system performance indications for multiple helicopter systems, particularly when